

The

Virginia Retirement System

Presentation to the

Joint Legislative Audit and Review

Commission

July 10, 2000

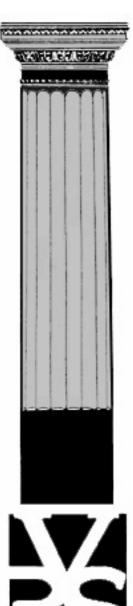
Bill Leighty, Director

Nancy Everett, Chief Investment Officer



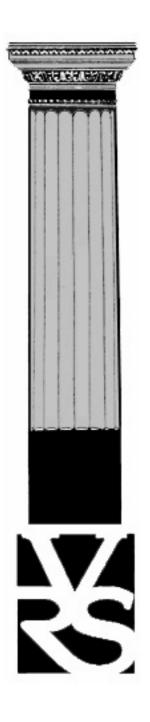
1994 JL AR C R ecommendations (1)

- Improve independence and quality
 - » Revamp VRS Board of Trustees and strengthen its Advisory Committees
 - » Codify CIO position
 - » Establish JLARC's role as legislative oversight for the VRS
- Strengthen investment policies and performance



1994 JLARC Recommendations (11)

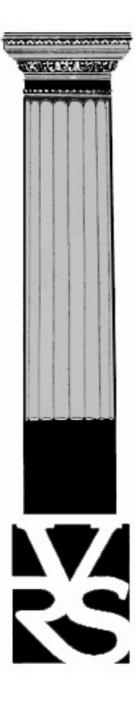
- Review actuarial practices
 - » Establish a funding target
 - » Examine trends in funded status, consider alternative funding methods
 - » Modify actuarial process to recognize timing lags, and consider the amortization period for unfunded liabilities, actuarial gains and losses, actuarial changes, etc.
 - » Analyze economic actuarial assumptions, demographic assumptions and long-term implications of changes in assumptions
 - » Analyze the current actuarial losses for likely recurrence
- Review of the VRS actuarial valuation every five years



VRS Membership Distribution

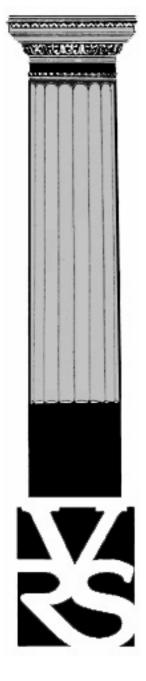
State	77,096
Teacher	123,090
Pol. Sub.	82,644
SPORS	1,713
JRS	392
VaLORS	10,410
Total	295,345
Retirees/Beneficiaries	94,453
Inactive - Vested	19,814
Inactive - Non-vested	59,141
VRS Overall Impact	468,753

These March 2000 statistics are the most recent data collected.

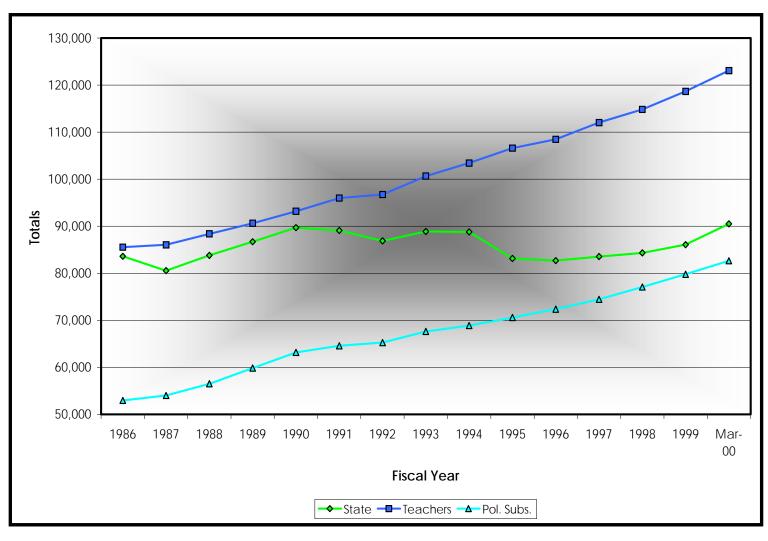


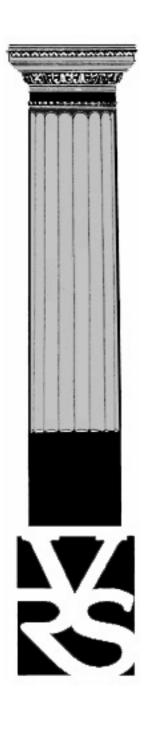
Virginia Retirement System Participating Employers

Cities and Towns	139
Counties	92
S pecial Authorities	146
S chool Divisions	154
S tate Agencies	237
Total	768



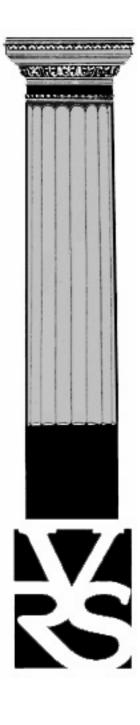
VRS Active Members





VRS FY2000 Strategic Business Objectives

- Technology availability schedules for critical business applications and achieve 98.5% availability for each category.
- 95% of employer payrolls updated and posted within 30 days
 of due date with 50% of the active members hip transmitted
 electronically; the average number of days to process
 purchase prior service cost letters is 30 days from receipt of
 completed application.
- 98% of member benefits processed in a timely manner: (1) death claims 30 days; (2) refunds 60 days; (3) retirements placed on expected payroll provided received 90 days in advance.
- Information Center answers 80% of calls within 30 seconds with no more than 15% transferred.
- Administrative costs per member will not exceed \$50.
- Investments meet benchmarks for the year.

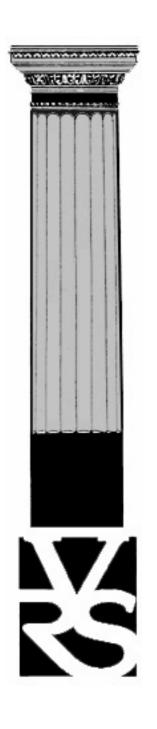


Performance Pay Matrix

	Exceeds Core Values	Meets Core Values	Does Not Meet Core Values
Exceeds Results	Agency SBOs AND Dept. SBOs Dept. SBOs or Agency SBOs Individual 4.17% Performance	Agency SBOs AND Dept. SBOs Dept. SBOs or Agency SBOs Individual 2.78% Performance	No performance increase
Meets Results	Agency SBOs AND Dept. SBOs Dept. SBOs or Agency SBOs Individual 2.78% Performance	Agency SBOs AND Dept. SBOs 2.78% Dept. SBOs or Agency SBOs 2.31% Individual 1.85% Performance	No performance increase
Does Not Meet Results	No performance increase	No performance increase	No performance Increase – Performance probation

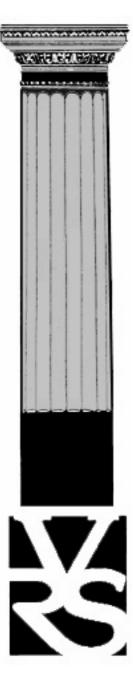
INDIVIDUAL PERFORMANCE

- + **DEPARTMENT GAINSHARING (25% MULTIPLIER)**
- + AGENCY GAINSHARING (25% MULTIPLIER)
- **= TOTAL PERFORMANCE PAY**



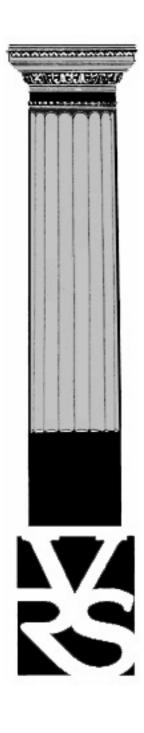
Continuous Efforts at Self-Improvement

- P.I.T. Crews
- Agency Mission and Vision Statements
- Agency Core Values
- Agency Strategic Business
 Objectives
- Departmental SBOs
- Benchmarking
- Activity-based Costing



U.S. Senate Productivity & Quality Award

VRS the recipient of the SPQA Award for Outstanding Achievement in 1997, 1998 & 1999



International Benchmarking

We are comparing ourselves to other large, quality public pension systems, both domestic and foreign.

Benefits achieved include being able to adapt "Best Practices" of others to suit our own needs.

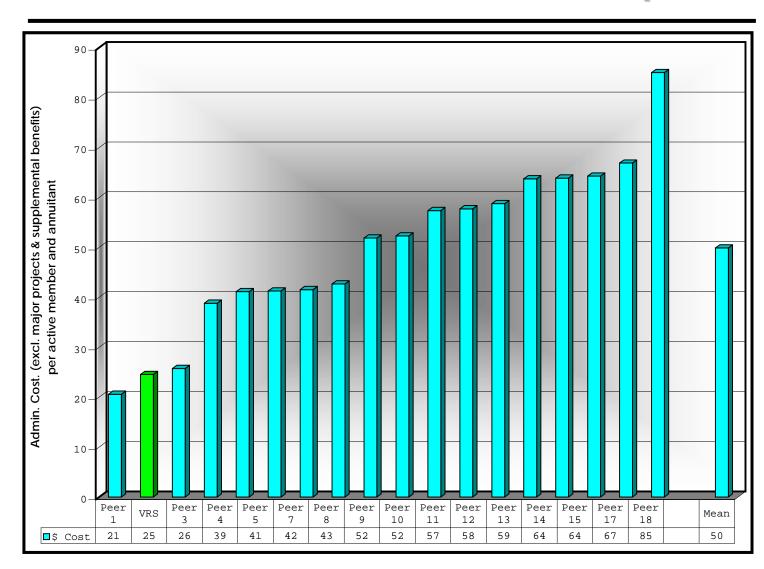
Last year, 25 leading international pension systems participated in the 1999 Benefit Administration Benchmarking project.

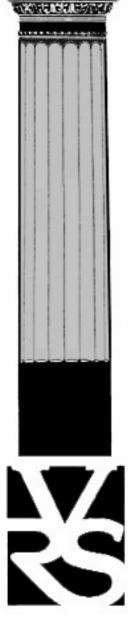
1999 Participants	
United States	<u>Canada</u>
CalPERS	HOOPP
CalSTRS	Ontario T eachers
Colorado PERA	
Illinois TRS	<u>Australia</u>
KPERS	ComS uper
MOSERS	
New Jersey DP&B	<u>The Netherlands</u> *
NYSLRS	ABP
Ohio PERS	Akzo Nobel
Ohio STRS	MN Services/BPMT
Oregon PERS	Pensioensfonds PGGM
Texas ERS	SFB/Bpf-bouw
Virginia RS	SPF Beheer bv
Washington State DRS	Stichting Pensioenfonds Hoogovens
Wisconsin DETF	

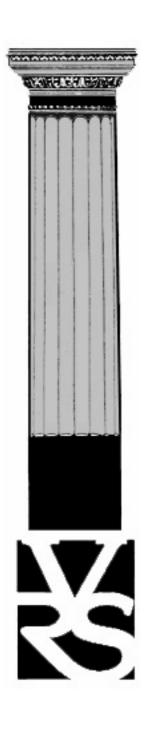
^{*} We have not yet completed deaning and analyzing the data from the 7 Dutch Systems.



Administrative Costs Per Member (second lowest of 18 peers)

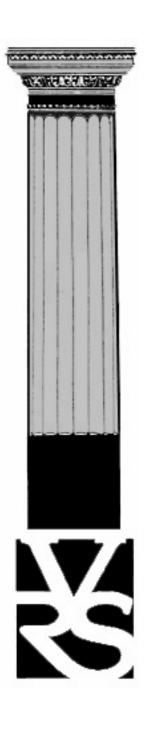






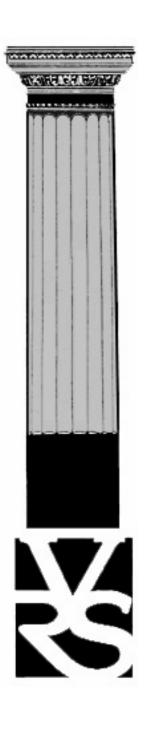
The "Real" VRS Story

- The average retiree retires at age 62
- Average life expectancy is 20 years
- Two years paid by Employee Contributions
- Four years paid by Employer Contributions
- 14 years paid for with Investment Earnings



1994 JL AR C R ecommendations

- Strengthen investment policies and performance
 - » Adopt prudent person standard
 - » Adopt investment policy statement and reevaluate investment policies
 - » Strengthen asset allocation process
 - » E valuate internal staff size and external managers in order to optimize



Prudent Person Standard

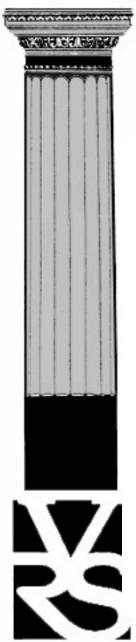
• § 51.1-124.30. Board as trustee of funds; investments; standard of care; liability for losses.

C. The Board shall discharge its duties with respect to the Retirement System solely in the interest of the beneficiaries thereof and shall invest the assets of the Retirement System with care, skill, prudence, and diligence under the circumstances then prevailing that a prudent person acting in a like capacity and familiar with such matters would use in the conduct of an enterprise of a like character and with like aims. The Board shall also diversify such investments so as to minimize the risk of large losses unless under the circumstances it is clearly not prudent to do so.

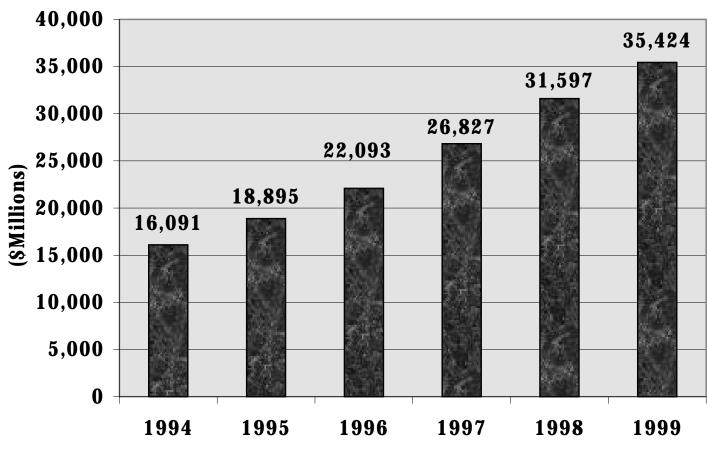


VRS Investment Policy Statement

The Investment objective of the VRS
 portfolio is to maximize long term
 investment returns while targeting an
 acceptable level of risk. Primary risk
 measures are volatility in the plan's
 assets, funded status and contribution
 rates.



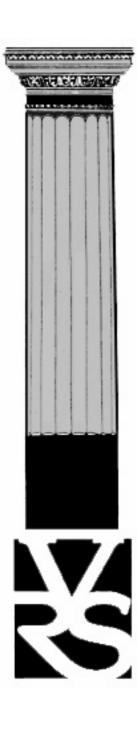
Increase in Total Fund Assets





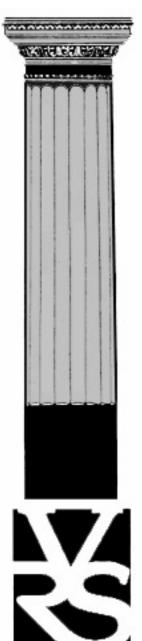
Virginia Retirement System 1994 - 2000

- Trustees focus on strategic direction
- Eliminate managed futures
- Eliminate collar
- Eliminate RF&P
- Eliminate market timing
- Curtail the use of consultants
- Improve relationship with legislature
- Keep "name" out of news papers



Virginia Retirement System 1994 - 2000

- Concentrate reduce number of managers
- R educe fees
- Increase passive indexing
- Increase internal management
- Develop & implement fair and "competitive" compensation package
- Strengthen staff

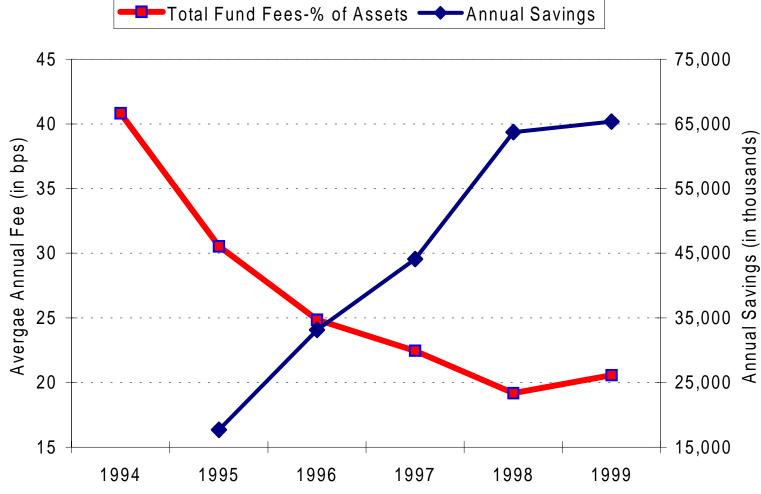


Reduce Number of Managers

Managers - June 1994		Managers - April 2000		
US Equity	31	US Equity	12	
Non-US Equity	8	Non-US Equity	6	
FixedIncome	9	FixedIncome	5	
Total	48	Total	23	

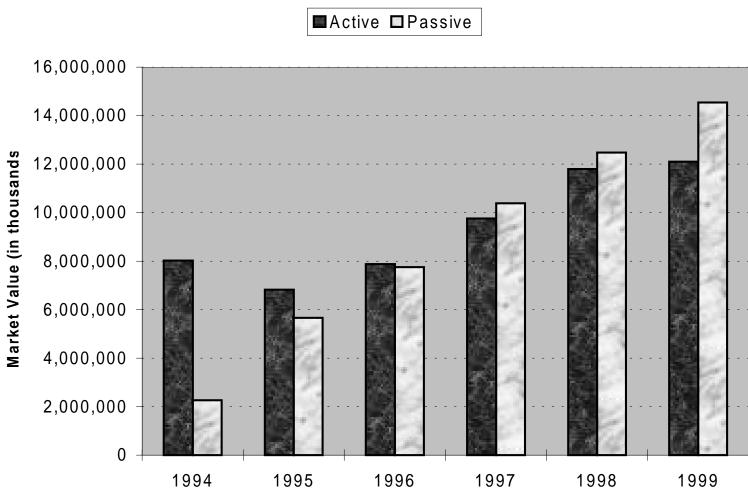
(XOREMEDICENES)

Significant Reduction in Management Fees



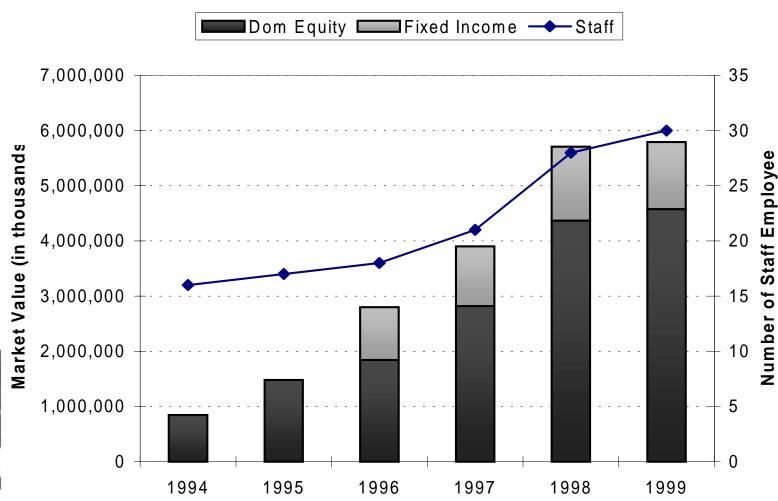


More Assets under Passive Management

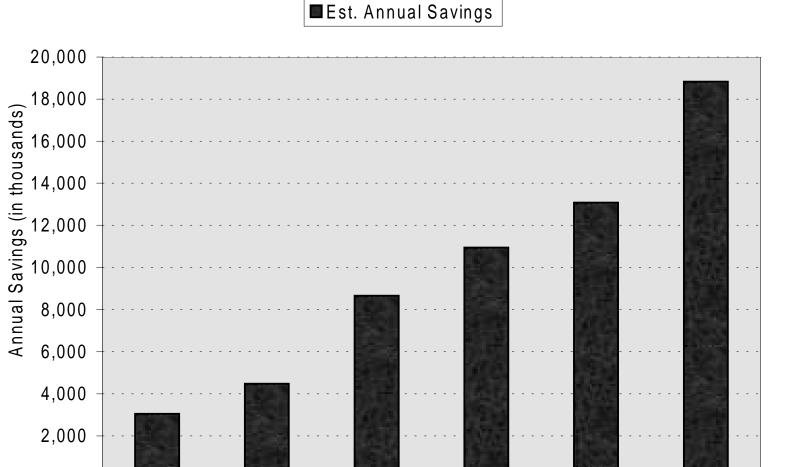


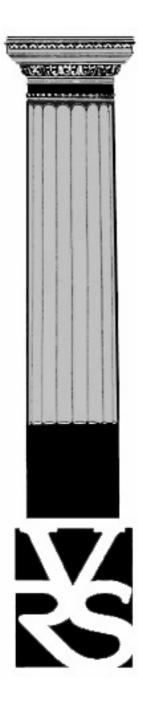
WINDERSON

More Assets Managed Internally, Staffing Has Increased



Significant Cost Savings on Internally Managed Assets vs. External Actively Managed Assets





Strengthen Professional Staff

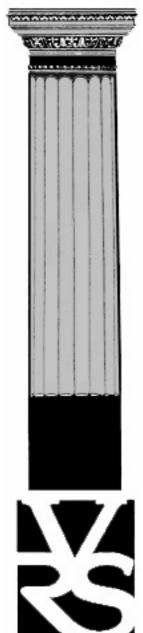
Investment Staff (1994): 22

• Investment Staff (2000): 30

	<u>1994</u>	<u>2000</u>
CIO	1	1
E quity	10	9
Fixed Income	1	5
Alt. Inv.	6	5
Operations	0	7
Administration	4	1
Deferred Comp	O	2

22

30

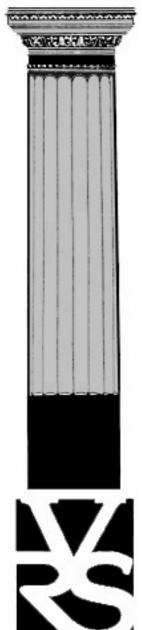


VRS Performance

(December 31, 1999)*

-	<u>10-year</u>	<u>5-year</u>	<u>1-year</u>
Total Fund	13.0 %	19.0 %	18.3 %
US Equity	17.1 %	25.7 %	18.2 %
Fixed Income	7.9 %	7.9 %	-0.6 %
Actuarial Assumption	8 %	8 %	8 %

^{*} Annualized rate of return

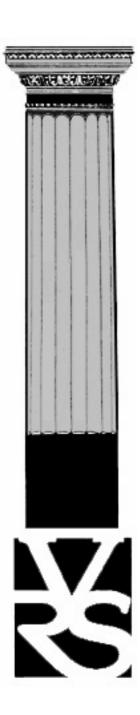


VRS Performance

(April 30, 2000)*

-	<u>10-year</u>	<u>5-year</u>	<u>1-year</u>
Total Fund	13.6 %	17.7 %	14.7 %
US Equity	17.7 %	23.0 %	10.0 %
Fixed Income	8.3 %	6.9 %	1.2 %
Actuarial Assumption	8 %	8 %	8 %

^{*} Annualized rate of return



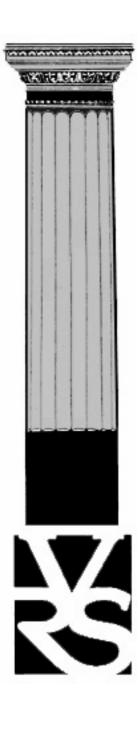
VRS Asset Allocation

1994

- 45% US Equity
- 10% Non-US Equity
- 27% Global Fixed Inc
 25% Global Fixed Inc
- 6% Private Equity
- 9% Real Estate
- 3% Managed Futures

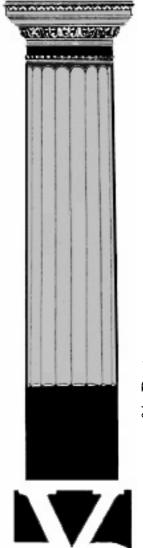
2000

- 47% US Equity
- 15% Non-US Equity
- 9% Private Equity
- 4% Real Estate



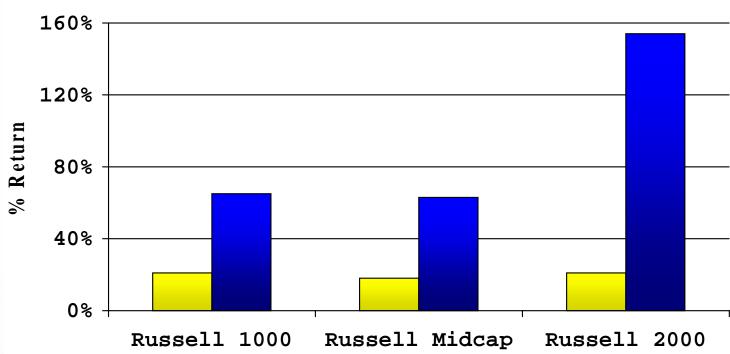
Major Decision Points

- Asset Allocation
 - » Appropriate asset dasses
 - » Asset/Liability study
- Individual Program Structure
 - » Appropriate benchmark
 - » How much passive?
 - » How active?
 - » How much internal?
 - » Specific issues



Profitability Does Not Equal Return

1999 Returns by Profitability



□Total Index Return

■Average Return of Companies with Projected EPS Losses

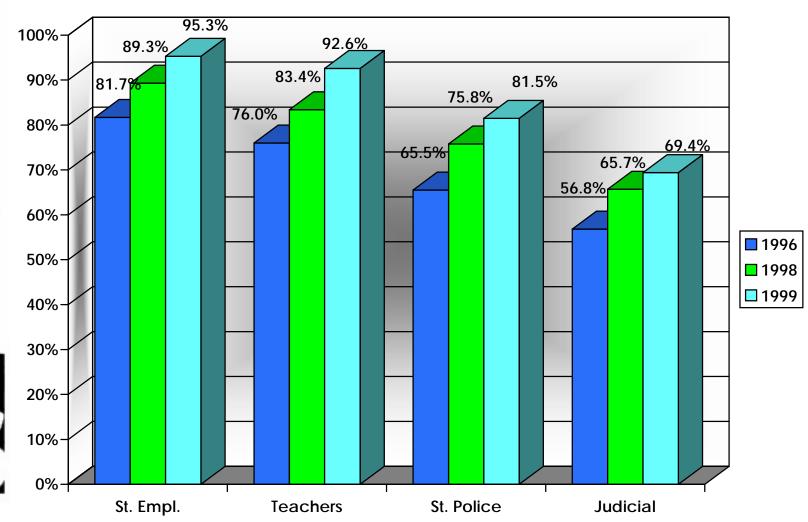


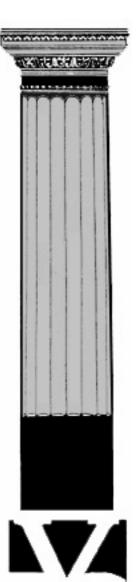
Looking Forward

- Actuarial process
 - » Focus on liabilities
 - » Culmination of collaborative effort
 - VRS Board, JLARC, Actuary, VRS staff
 - » Estimated completion 1st quarter 2001

.......... CANCELE SILES OF THE SAME

Actuarial Funded Ratio





Summary of Recommended Contributions with Full COLA Prefunding

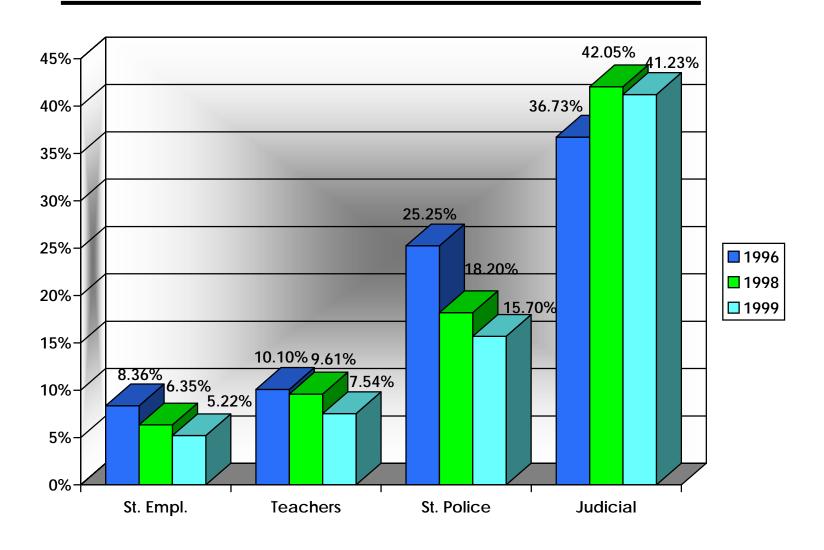
	1999	1998	1996
State Employees	5.22%	6.35%	8.36%
Teachers	7.54%	9.61%	10.10%
State Police Officers	15.70%*	18.20%	25.25%
State Judges	41.23%**	42.05%	36.73%

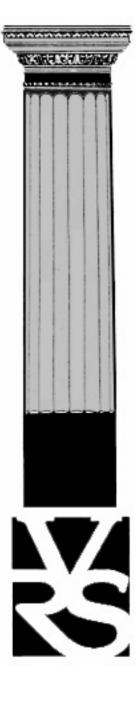
^{*} Boardspecified rate is 25% of payroll until 90% funded.

^{**} Board specified rate is 45% of payroll until 90% funded.

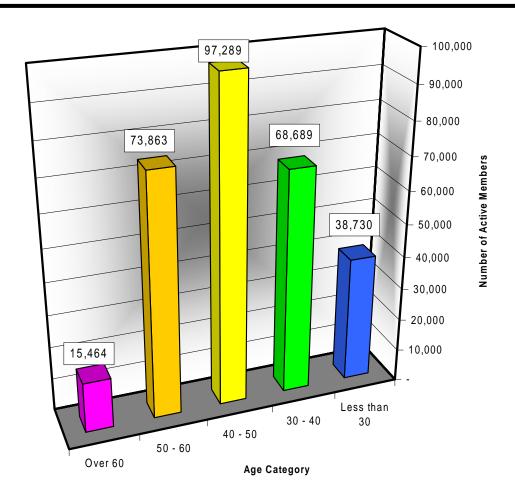
........... CANADAGE MESTRAL

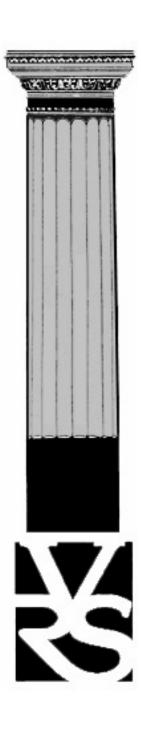
Contribution Rates With Full Prefunding (Excluding Health Credit)





Age Categories of Active Members The Wave is Coming!!





Any Questions??